

Goal 4: Healthy Communities and Ecosystems

Objective 4.2: Communities

Subobjective: 4.2.4 Sustain and Restore US-Mexico Border Ecosystems

Mexico Border Ecosystems

In the U.S.-Mexico Border Region, sustain and restore community health and preserve the ecological systems that support them.

Background

The United States and Mexico have a long-standing commitment to protect the environment and public health in the U.S.-Mexico Border Region. The U.S.-Mexico Border 2012 Program, a joint effort between the U.S. and Mexican governments, will work with the 10 border states, Indian Tribes and with border communities to improve the region's environmental health. This is the most recent articulation of the two governments' commitment. The governments of Mexico and the United States agreed, in November 1993, to assist communities on both sides of the border in coordinating and carrying out environmental infrastructure projects. The agreement between Mexico and the United States furthers the goals of the North American Free Trade Agreement and the North American Agreement on Environmental Cooperation.

In January 2001, EPA estimated water and wastewater infrastructure needs along the U.S.-Mexico border at \$4.5 billion. To respond to serious health threats due to environmental infrastructure deficits, EPA will work with two key partners (in addition to our partners in the Mexican government and the International Boundary and Water Commission (IBWC)), the Border Environment Cooperation Commission (BECC) and the North American Development Bank, which manages the Border Environmental Infrastructure Fund (BEIF), to support the financing and construction of water and wastewater treatment.

As part of Border 2012, to help bridge the coordination issues, a number of border-wide and regional workgroups and Policy Forums will collaborate with local communities to set priorities and plan and implement projects. These groups will also assist in establishing objectives, defining indicators, and measuring progress.

One focus of Border 2012 will be improved water quality in the region. Because of inadequate drinking water and sewage treatment, border residents suffer disproportionately from hepatitis A and other water-borne diseases. By increasing the number of connections to potable water systems, EPA and its partners will reduce health risks to residents who may currently lack access to safe drinking water. Similarly, by increasing the number of homes with access to basic sanitation, EPA and its partners will reduce the discharge of untreated domestic wastewater into surface and ground water. Our planned assessment of shared and transboundary surface waters

will facilitate the collection, management, and exchange of environmental data essential for effective water management.

A) Environmental/Health Results Expected

Environmental and public health results identified in the new EPA *Strategic Plan* related to water quality along the Mexico Border are:

- 1) **Achieve water quality standards currently being exceeded in shared and transboundary waters where standards currently being exceeded:**

2002 Baseline: na 2005 Target: na 2008 Target: >50% ¹

- 2) **Protect the health of people in the Mexico border area by providing adequate water and wastewater sanitation systems funded through the Border Environmental Infrastructure Fund:**

2002 baseline: 790,000 persons provided access 2005: 1.5 million

B) Key Strategies

The basic approach to improving the environment and public health in the U.S. Mexico Border Region is the Border 2012 Plan. Under this Plan, EPA expects to take the following key Actions to improve water quality and protect public health.

- 1) **Core Program Implementation:** EPA will continue to implement core programs under the Clean Water Act and related authorities, ranging from discharge permit issuance, to watershed restoration, to nonpoint pollution control.
- 2) **Wastewater Treatment Financing:** Federal, State, and local institutions participate in border area efforts to improve water quality through the construction of infrastructure and development of pretreatment programs. Specifically, Mexico's National Water Commission (CNA) and EPA provide funding and technical assistance for project planning and construction of infrastructure.

Congress has provided \$725 million for Border infrastructure from 1995 to 2004. The International Boundary and Water Commission (IBWC) also provided assistance and coordination in the development of infrastructure facilities. For

¹ After a development phase in FY2004-2005, reaching a majority (> 50 %) by 2012 would interpolate to ~ 30% by 2008.

FY 2005, EPA expects to be able to provide funding of \$50 million per year for these projects.

This funding level will support significant project implementation, but will not be adequate to meet the targets for access to basic sanitation. EPA will continue working with all of its partners to leverage available resources to meet priority needs.

- 3) **Build Partnerships:** Partnerships are critical to the success of efforts to improve the environment and public health in the Border Region.

Since 1995, the NAFTA-created institutions, the Border Environment Cooperation Commission (BECC) and the North American Development Bank (NADB), have had the primary role in working with communities to develop and construct infrastructure projects. BECC supports efforts to evaluate, plan, and implement financially and operationally sustainable water and wastewater projects; NADB helps project sponsors develop the appropriate financial package. EPA will continue to support these institutions.

In FY 2005, EPA will coordinate with Mexico's National Water Commission (CNA) to develop a workplan to define specific steps needed to accomplish the water quality improvement goals expressed in the Border 2012 Plan.

- 4) **Improve Measures of Progress:** During FY 2005, EPA will work with CNA, States, Border-area Tribes and other institutions to improve measures of progress toward water quality and public health goals.

Implementation Specifics

The co-leads are James Hanlon, Director, Office of Wastewater Management, and Miguel Flores and Alexis Strauss, Division Directors in Regions 6 and 9, respectively. Successful implementation will include participation by Offices of International Activities (OIA), Science and Technology (OST) and Wetlands, Oceans, and Watersheds (OWOW). As noted above, we will also have participation from several international partners.

Strategic Targets

- C By 2012, assess significant shared and transboundary surface waters and achieve a majority of water quality standards (WQS) currently being exceeded in those waters. (The baseline is the shared and transboundary surface waters as defined, identified, and evaluated for the United States in the Clean Water Act §305(b) reports and for Mexico by the Secretariat for the Environment and Natural Resources.)
- C By 2005, protect the health of 1.5 million people in the Mexico border area by providing adequate water and wastewater sanitation systems funded through the Border

Environmental Infrastructure Fund. (Cumulative.) (1998 Baseline: 0 additional people provided with access to potable water and wastewater collection and treatment systems; estimated 2002 baseline of 790,000 persons provided with access.)

Approach – How will the “outcomes” be achieved?

- o What are the interim strategic targets for the WQS target? [Note - Not final until receive final concurrence of CNA.]

C Note: Existing activities undertaken by both federal Governments and the ten States will be ongoing during the period of 2004 to 2012.

Actions for 2004:

Define and select the priority shared watershed basins, sub-basins, river segments or waterbodies within the 62.5 mile (100 km) US/Mexico border area that are not achieving the designated water uses or water quality standards, using baseline data for year 2003, with the assistance of the Regional Work Group water task forces.

Actions for 2005:

Begin data collection and gap analysis of the impaired water bodies not achieving water quality standards or designated uses with the assistance of the Regional Work Group water task forces.

Actions for 2006 and beyond:

Begin re-assessment, by the States or federal authorities, of the water quality data for watershed basins, sub-basins, river segments or water bodies to identify impaired water bodies, noting that assessment of water quality data for the United States is under the strict authority of the States.

- o What are the interim strategic targets for the sanitation target? [Note - The target in Border 2012 for sanitation is: By 2012, promote a 25% increase in the number of home connected to potable water supply and wastewater collection and treatment systems.]

C 2003 - 900,000 (achieved 864,000; 96%)

C 2004 - 990,000

C The original sanitation target was established assuming higher funding availability for the Border program than currently exists.

Actions for 2004 for Border 2012 target:

Obtain population, project and public/private utility coverage data for federal and state infrastructure programs starting for baseline year 2003 with the assistance of the Regional Work Group water task forces.

Compare information to eliminate duplication (double-counting), as some projects are funded by multiple sources.

Develop a baseline from which to measure future project impacts.

Identify projects within the next three-year time frame for each organization with the assistance of the Regional Work Group water task forces.

Actions for 2005 for Border 2012 target:

Estimate project population numbers and compare with objective.

Identify funding shortfalls and other obstacles with the assistance of the Regional Work Group water task forces.

What are the operational approaches?

C These strategic targets are part of a larger binational effort established under Border 2012.

C For the WQS target:

- Implementation of core programs under the CWA and organic Mexican law.
- Increasing capacity of Border communities and residents.
- Providing Border infrastructure funding for the most needy to leverage other resources to build water and wastewater infrastructure.

C For the sanitation target:

- Increasing capacity of Border communities and residents.
- Providing Border infrastructure funding for the most needy to leverage other resources to build water and wastewater infrastructure.

What are the program activity measures?

C These will be developed with CNA, after stakeholder involvement.